



## Take Test: Indirect Communication

### Test Information

Description

Instructions

Multiple Attempts This test allows multiple attempts.

Force Completion This test can be saved and resumed later, unless it is a timed test. Once you start a timed test, the timer continues even if you leave the test and/or the LMS.

Question Completion Status:

Save All Answers

Save and Submit

### QUESTION 1

10 points

Save Answer

IP multicast is:

- ☐ a. Space-uncoupled.
- ☐ b. Time-coupled.
- ☐ c. Time-uncoupled.
- ☐ d. Both a) and b).
- ☐ e. Both a) and c).

### QUESTION 2

10 points

Save Answer

In the context of group communication, a group is said to be overlapping if:

- ☐ a. Entities can choose to send messages to a subset of the group members.
- ☐ b. Only entities that are members of the group may multicast to it.
- ☐ c. Entities outside the group may send messages to it.
- ☐ d. Entities may be members of at most one group.
- ☐ e. Entities may be members of multiple groups.

**QUESTION 3****10 points****Save Answer**

In the context of indirect communication, which of the following is not true for group communication?

- ☐ a. The sender is not aware of the identities of the receivers.
- ☐ b. Multiple send operations are issued to individual processes.
- ☐ c. In some cases, it is possible for processes outside a group to send messages to it.
- ☐ d. It may be implemented over IP multicast.
- ☐ e. It may be used to support the consistent update of replicated data.

**QUESTION 4**Question Completion Status: 0/100

In tuple space communication:

- ☐ a. Tuples are accessed by pattern matching on content.
- ☐ b. The read operation returns a tuple and removes it from the tuple space.
- ☐ c. Placing a tuple in the tuple space will affect existing tuples in the space.
- ☐ d. Tuples in a given tuple space must have the same number and type of data fields.
- ☐ e. Tuples in tuple space are mutable in that they can be modified by users.

**QUESTION 5****10 points****Save Answer**

Using a single multicast operation as opposed to using multiple send operations offers which of the following advantages:

- ☐ a. It enables a more efficient utilisation of bandwidth.
- ☐ b. It enables a the minimisation of the total time taken to deliver the message to all destinations as compared with serialised transmission.
- ☐ c. It has the potential to offer reliability guarantees.
- ☐ d. All of the above.
- ☐ e. Both a) and b).

**QUESTION 6****10 points****Save Answer**

When using IP multicast, which one of the following is most likely true?

- ☐ a. Is available for UDP and TCP.
- ☐ b. Is readily available across autonomous system on the Internet
- ☐ c. Requires a VLAN to operate correctly.
- ☐ d. An application can join a multi-cast group by making its socket join the group.
- ☐ e. Omission failure leads to none of the recipients receiving the message.

**QUESTION 7****10 points****Save Answer**

Which of the following communication techniques is not based on the direct coupling of a sender and a receiver?

- ☐ a. TCP-based communication between a client and a server.
- ☐ b. UDP datagram communication between a client and a server.
- ☐ c. Tuple spaces.
- ☐ d. Remote method invocation.
- ☐ e. Remote procedure call.

🚩 Question Completion Status:

**QUESTION 8****10 points****Save Answer**

Which of the following is not a characteristic of message queues?

- ☐ a. Messages are delivered within a specified time frame.
- ☐ b. The message sent is guaranteed to be identical to the one received.
- ☐ c. The delivery of messages is guaranteed.
- ☐ d. They are point-to-point in that the sender places the message into a queue, and it is then removed by a single process.
- ☐ e. Messages are stored indefinitely.

**QUESTION 9****10 points****Save Answer**

Which of the following is not true regarding distributed shared memory (DSM)?

- ☐ a. Processes sharing DSM can cause one another to fail by erroneously altering data.
- ☐ b. Processes communicating via DSM may execute with non-overlapping lifetimes.
- ☐ c. It is used for sharing data between computers that do not share physical memory.
- ☐ d. Variables stored in DSM have to be marshalled.
- ☐ e. DSM appears as memory in the address space of a process.

**QUESTION 10****10 points****Save Answer**

Which one of the following is most likely not a role of an Observer in a publish-subscribe system?

- ☐ a. Filtering of notifications.
- ☐ b. Subscribing to events.
- ☐ c. Acting as a notification mailbox.
- ☐ d. Forwarding.

- ☐ e. Correlating patterns of interest.

Save All Answers

Save and Submit

🚩 Question Completion Status: